



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/019,124	10/25/2001	Tetsujiro Kondo	450101-03023	8093
20/999 7590 06/02/2009 FROMMER LAWRENCE & HAUG 745 FIFTH AVENUE- 10TH FL. NEW YORK, NY 10151				
EXAMINER				
DESTR, JEAN WICEL				
ART UNIT		PAPER NUMBER		
2622				
MAIL DATE		DELIVERY MODE		
06/02/2009		PAPER		

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/019,124

**Applicant(s)**

KONDO ET AL.

**Examiner**

Jean W. Désir

**Art Unit**

2622

**Period for Reply** -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 3/16/09 (RCE with Amendment).
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-19, 21-39, 41-59 and 61-65 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 61-65 is/are allowed.
- 6) ☒ Claim(s) 1-13, 15-19, 21-33, 35-39, 41, 42, 45-52 and 54-59 is/are rejected.
- 7) ☒ Claim(s) 14, 34, 43, 44 and 53 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-946)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-13, 16-19, 21-33, 36-39, 41, 42, 45-52, 55-59 are rejected under 35 U.S.C. 102(e) as being anticipated by Kondo et al (US 6,323,905).

The applied reference has a common Inventor with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

#### **Claim 1:**

Kondo discloses:

"an improvement information generating unit adapted to generate improvement information for improving quality of data", see Fig. 1 items 2-5, the information

generated by items 2-5 through learning process that will increase or improve the quality of picture data are considered as improvement information as claimed, see also col. 1 lines 10-11, col. 9 lines 27-56;

“and an embedding unit adapted to embed a plurality of types of improvement information into the data, wherein the improvement information generating unit generates the plurality of types of improvement information for converting the data into a plurality of qualities”, see Fig. 1 items 5, 6, 1 which are constructed to embed a plurality of types of improvement information (a plurality of prediction coefficients) into the data (picture data) for converting the data into a plurality of qualities, as claimed, see also col. 9 line 57 to col. 10 line 26, col. 11 line 50 to col. 12 line 7, col. 12 lines 47-55;

“and wherein the embedding unit embeds the plurality of types of improvement information into the data so that the data and the improvement information can be restored”, see col. 11 line 50 to col. 12 line 7, col. 12 line 47 to col. 13 line 35.

Claims 2, 3 are disclosed, see col. 9 lines 27-56, Fig. 6.

Claim 4 is disclosed, see col. 12 lines 22-61, Fig. 6.

Claims 5-7 are disclosed, see col. 12 lines 47-61, col. 14 lines 55-67, col. 15 lines 42-67.

Claim 8 is disclosed, see col. 14 lines 32-65.

Claim 9 is disclosed, see col. 12 lines 47-61, Fig. 6.

Claims 10, 11 are disclosed, see col. 9 lines 27-56, Fig. 6.

Claims 12, 13 are disclosed, see col. 13 lines 20-62, col. 15 line 42 to col. 16 line 7, Figs. 6, 8.

Claim 16 is disclosed, see col. 4 lines 15-48.

Claim 17 is disclosed, see col. 1 lines 7-11.

**Claims 18, 19** are rejected for the same reasons as claim 1.

**Claim 21:**

Kondo discloses:

A data processing device (see Fig. 1) for processing embedded data obtained by embedding a plurality of types of improvement information for improving quality of data into the data, the device comprising:

“an extracting unit adapted to extract the plurality of types of improvement information from the embedded data”, see Fig. 1 items 2-5 and the feedback that includes item 7;

“and an improving unit adapted to improve the quality of the data by using one of the plurality of types of improvement information according to a user request”, see Fig. 1 items 5, 6, col. 11 line 50 to col. 12 line 7, col. 16 lines 5-21;

“and wherein the plurality of types of improvement information are embedded into the data so that the data and the improvement information can be restored”, see col. 11 line 50 to col. 12 line 7, col. 12 line 47 to col. 13 line 35.

Claim 22 is disclosed, see col. 9 line 57 to col. 10 line 26.

Claim 23 is disclosed, see col. 9 lines 38-67.

Claim 24 is disclosed, see col. 12 lines 22-61, Fig. 6, col. 11 line 50 to col. 12 line 7.

Claims 25, 26 are disclosed, see col. 13 lines 12-62.

Claims 27-29 are disclosed, see col. 9 line 38 to col. 10 line 26, col. 12 lines 47-61, col. 15 lines 42-67.

Claim 30 is disclosed, see col. 14 lines 32-65.

Claim 31 is disclosed, see col. 12 lines 47-61, Fig. 6.

Claims 32, 33 are disclosed, see col. 9 lines 27-56, Fig. 6.

Claim 36 is disclosed, see col. 4 lines 15-48.

Claim 37 is disclosed, see col. 1 lines 7-11.

**Claims 38, 39** are rejected for the same reasons as claim 21.

**Claim 41:**

Kondo discloses:

“an improvement information generating unit adapted to generate a plurality of types of improvement information for improving quality of data (see Fig. 1 items 2-5, the information generated by items 2-5 through learning process that will increase or improve the quality of picture data are considered as a plurality of types of improvement information as claimed, see also col. 1 lines 10-11, col. 9 lines 27-56), wherein one of the plurality of types of improvement information is embedded into the data (see col. 9 line 57 to col. 10 line 26, col. 11 line 50 to col. 12 line 7, col. 12 lines 47-55);

“an improvement information selecting unit adapted to select improvement information to be transmitted together with the data, from the plurality of types of improvement information”, see col. 14 line 66 to col. 15 line 21, col. 9 line 38 to col. 10 line 26;

"and a transmitting unit adapted to transmit the data and said one of the plurality of types of improvement information", see Fig. 1 items 1, 5, 6, transmit the data and one of the plurality of types of improvement information as claimed;

"and wherein said one of the plurality of types of improvement information is embedded into the data so that the data and the improvement information can be restored", see col. 11 line 50 to col. 12 line 7, col. 12 line 47 to col. 13 line 35.

Claim 42 is disclosed, see col. 9 line 38 to col. 10 line 26, col. 15 lines 1-21.

Claims 45-47 are rejected for the same reasons as claims 2-4.

Claims 48-52 are rejected for the same reasons as claims 6-10.

Claim 55 is disclosed, see col. 4 lines 15-48, Fig. 1 items 1, 5, 6.

Claim 56 is disclosed, see Fig. 1 items 1, 5, 6.

Claim 57 is disclosed, see col. 1 lines 7-11.

**Claims 58, 59** are rejected for the same reasons as claim 41.

3. Claims 1, 15-19, 41, 42, 54-59 are rejected under 35 U.S.C. 102(b) as being anticipated by DeJean et al (US 5,243,423).

**Claim 1:**

DeJean discloses:

"an improvement information generating unit adapted to generate improvement information for improving quality of data", see col. 1 lines 40-47, col. 2 lines 50-62;

"and an embedding unit adapted to embed a plurality of types of improvement information into the data, wherein the improvement information generating unit

generates the plurality of types of improvement information for converting the data into a plurality of qualities", see col. 1 lines 40-49, col. 2 lines 16-27, col. 4 lines 45-62;

"and wherein the embedding unit embeds the plurality of types of improvement information into the data so that the data and the improvement information can be restored", see col. 5 lines 5-36.

Claim 15 is disclosed, see col. 4 lines 5-26.

Claim 16 is disclosed, see col. 4 lines 47-59.

Claim 17 is disclosed, see col. 1 lines 40-49.

**Claims 18, 19** are rejected for the same reasons as claim 1.

**Claim 41:**

DeJean discloses:

"an improvement information generating unit adapted to generate a plurality of types of improvement information for improving quality of data (see col. 1 lines 40-47, col. 4 lines 45-62), wherein one of the plurality of types of improvement information is embedded into the data (see col. 1 lines 40-49, col. 2 lines 16-27, col. 4 lines 45-62)";

"an improvement information selecting unit adapted to select improvement information to be transmitted together with the data, from the plurality of types of improvement information", see col. 4 lines 45-62, col. 1 lines 40-47, Fig. 1 items 34, 32;

"and a transmitting unit adapted to transmit the data and said one of the plurality of types of improvement information", see col. 4 lines 3-26, col. 1 lines 40-49, col. 2 lines 47-62;



"and wherein said one of the plurality of types of improvement information is embedded into the data so that the data and the improvement information can be restored", see col. 5 lines 5-36.

Claim 42 is disclosed, see col. 4 lines 45-62, col. 1 lines 40-47.

Claim 54 is disclosed, see col. 4 lines 5-26.

Claim 55 is disclosed, see col. 4 lines 47-62.

Claim 56 is disclosed, see col. 4 lines 3-26, col. 1 lines 40-49.

Claim 57 is disclosed, see col. 1 lines 40-49.

**Claims 58, 59** are rejected for the same reasons as claim 41.

#### ***Claim Rejections - 35 USC § 103***

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. Claims 21, 35-39 are rejected under 35 U.S.C. 103(a) as being unpatentable over DeJean et al (US 5,243,423).

#### **Claim 21:**

DeJean discloses:

A data processing device for processing embedded data obtained by embedding a plurality of types of improvement information for improving quality of data into the data (col. 1 lines 40-49, col. 2 lines 50-62, col. 4 lines 45-62), the device comprising:

"an extracting unit adapted to extract the plurality of types of improvement information from the embedded data", see col. 5 lines 5-36;

"and an improving unit adapted to improve the quality of the data by using one of the plurality of types of improvement information according to a user request", see col. 1 lines 40-49, col. 4 lines 45-62;

"and wherein the plurality of types of improvement information are embedded into the data so that the data and the improvement information can be restored", see col. 5 lines 5-36;

as pointed out, DeJean discloses all the claimed limitations, except DeJean does not explicitly teach "according to a user request" as claimed. However, Official Notice is taken, improve quality of data according to user request is a notoriously well known technique in the art used in order to provide information according to the user's preference or need; thus, an artisan would be motivated to modify DeJean and implement this existing technique to arrive at the claimed invention; Therefore, the claimed invention would have been obvious to a person of ordinary skill in the art at the time the invention was made.

Claim 35 is disclosed, see col. 5 lines 5-21.

Claim 36 is disclosed, see col. 5 lines 22-36, col. 6 line 55 to col. 7 line 17.

Claim 37 is disclosed, see col. 1 lines 40-49.

**Claims 38, 39** are rejected for the same reasons as claim 21.

***Response to Arguments***

6. Applicant's arguments have been fully considered but they are moot in view of new interpretation of the references necessitated by the amendment, and all the added limitations have been addressed in the rejection.

***Allowable Subject Matter***

7. Claims 14, 34, 43, 44, 53 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

8. Claims 61-65 are allowed.

**Conclusion**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jean W. Désir whose telephone number is (571) 272 7344. The examiner can normally be reached on 5/4/9 - First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David L. Ometz can be reached on (571) 272 7593. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2622

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

**/JWD/  
5-27-09**

/David L. Ometz/  
Supervisory Patent Examiner, Art Unit 2622